

IN THE SPECIFICATION:

On page 6, line 19, delete "include".

IN THE CLAIMS:

Please amend the claims as follows:

1. A substrate processing apparatus comprising:

- Sub 1*
- (a) a chamber comprising a radiation source;
 - (b) one or more detectors to detect a first radiation from the chamber, and a second radiation from the radiation source; and
 - (c) a signal analyzer adapted to normalize a property of the first radiation relative to a property of the second radiation.

40. A substrate processing apparatus comprising:

- A2*
- (a) a chamber comprising a radiation source other than a plasma in a process zone in the chamber;
 - (b) a detector to detect a property of a radiation from [a] the radiation source; and
 - (c) a feedback controller adapted to regulate a power level of the radiation source in relation to the detected property of the radiation.

Sub 3

42. An apparatus according to claim 40 wherein the feedback controller is adapted to maintain the property of the radiation at a substantially constant level.

44. A substrate processing apparatus comprising:

- (a) a chamber;
- (b) a radiation source;
- (c) a detector to detect a property of a radiation from a radiation source and generate a reference signal; and
- (d) a radiation modulator in a path of a radiation being transmitted from the radiation source to the chamber, [whereby] the radiation modulator being adapted to [may] receive a signal from the radiation source and control a property of the radiation in relation to the reference signal.

Please add the following claims:

57. A substrate processing apparatus comprising:

- (a) a chamber comprising a radiation source;
- (b) a detector to detect a property of a radiation from the radiation source; and
- (c) a feedback controller adapted to regulate a power level of the radiation source in relation to the detected property of the radiation, wherein the feedback controller is adapted to maintain the property of the radiation at a substantially constant level.

58. An apparatus according to claim 57 wherein the feedback controller is adapted to control a power supply that powers the radiation source.

59. An apparatus according to claim 57 wherein the detector is adapted to detect a property of the radiation comprising one or more of an intensity, phase or wavelength.